POTENTIAL AND FACTORS AFFECTING ECOTOURISM IN SRI LANKA

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\textbf{ABSTRACT}

Tourism in Sri Lanka has a strong, still growing role in helping to earn foreign exchange and create new employment. However, if adequate safeguards are not taken, present mass tourism could give rise to serious problems of environmental degradation. The cost of servicing mass tourism is very high due to heavy dependency on imported items. Furthermore, the rich industrialized tourist generating countries have control of hotel chains, international airlines, tour agencies etc. It is, therefore, questionable whether the real beneficiaries of this mass tourism are third world countries like Sri Lanka or the rich industrialized nations who dominate the above mentioned services.

The main objective of this study was to identify the potential for developing nature tourism in Sri Lanka and the factors affecting such tourism. The field survey was conducted over the period October 1994 to February 1995 using questionnaires prepared in English, French and German. Both non-parametric data presentation and regression analysis were employed in data analysis.

This study concludes that there is a significant potential for nature tourism in Sri Lanka. This type of tourism is shown to be less demanding in terms of accommodation standards and more demanding regarding obtaining information about tourist destinations. Social conflicts can be minimized when local people play an integral role in selecting and managing protected areas. Therefore, nature tourism can be recommended for Sri Lanka on a pilot project basis - decisions on further development can be taken after evaluation.

\textbf{INTRODUCTION}

During the past two decades, tourism in Sri Lanka has experienced an impressive growth. This growth has generally led to the creation of additional employment, an increased flow of scarce foreign exchange and an improvement of infrastructure in resort areas.
While bringing significant benefits to the economy of the Sri Lanka, the growth of tourism has also produced negative effects on the physical and social environment. Tourism in many cases has been responsible for causing severe damage to important ecosystems in the region (ESCAP, 1992), such as mangroves, coral reefs, lakes and forests.

The balance between tourism and environment is very delicate; it needs to be maintained through appropriate planning and environmental management. This study focuses on identifying a possible way of minimizing the adverse impacts of mass tourism while at the same time assuring a better distribution of the revenue generated by tourism - especially regarding local people.

PROBLEM STATEMENT

Many analysts (Balasuriya, 1993; Seneviratne, 1993; Singh, 1992) have adopted a negative attitude towards those who stress the economic and the development potential of tourism. Great antagonism seems to be directed towards tourism from Sociologists regarding its hidden cost to society in social, economic and environmental terms. The Central Bank report (1992), shows that the total income earned from tourism per year is about Rs 8,500 million from around 392,000 tourists. Further, it gives number of tourist nights estimated as 4 million. By simple calculation, the spending per tourist night is Rs 2,125.

The general belief is that a large portion of this money is going out of the country, because services are met with large quantities of imported items and the rich industrialized tourist generating countries have control of hotel chains, airlines, tour operations and travel agencies. If these are facts, one could questioned whether the real beneficiaries of this "traditional tourist industry" are third world countries like Sri Lanka or the rich industrialized countries who dominate the above mentioned services.

In addition to this, the natural resource base of the country as a capital good is not being well utilized by the existing system of tourism in Sri Lanka (Wickramanayake, 1992). That is, bio-diversity and natural beauty are not being utilized in an optimal manner as capital goods for tourism, recreation, education or as an aesthetic commodity and people believe that by adopting this traditional form of tourism, local countries are less favoured compared with developed countries.

The intention of this study was to identify factors affecting ecotourism in Sri Lanka. Imbalances existing in the industry today may be corrected by the alternative forms of tourism like ecotourism. The expected high revenues may be used to manage natural resources more efficiently. Such tourism may be useful in attracting tourists who are willing to spend more money to enjoy the unique natural resources of Sri Lanka while leaving a large proportion of such revenue in the hands of local people and giving due consideration to environmental and cultural factors.
OBJECTIVES OF THE STUDY

Nature based tourism is a specific commodity demanded by a special group of people around the world. Supply of this specific commodity is, in a way, fixed by nature itself. The main objective of this study was to identify the potential for nature based tourism in Sri Lanka and the factors affecting such tourism in Sri Lanka.

ECOTOURISM/ NATURE TOURISM

According to Winpenny (1991), the tourism "product" (i.e. the services being sold to visitors) is highly sensitive to environmental quality. Tourism suffers acutely from environmental damage caused by other sectors, but may also spoil its own environment. In the long run the tourist industry has a strong interest in environmental management and conservation. It often leads to the preservation and enhancement of key natural resources, buildings and monuments, where they would otherwise be exploited or neglected. It also helps to preserve local customs and crafts.

The issue for ecotourism or nature tourism, is how to set up a net-work of national parks, protected areas and other natural heritage sites so that tourism revenues will support the maintenance of the whole park system, with a substantial portion of revenues flowing back into community development (Laird, 1993).

In simple terms, ecotourism can be described as tourism that involves travelling to relatively undisturbed areas to study, admire and enjoy the scenery and its wild plants and animals, as well as the human culture of the area. A more comprehensive definition given by Ziffer (1989), was cited by Wickramanayake (1992) as follows:

Ecotourism is a form of tourism inspired primarily by the natural history of an area, including its indigenous cultures. The ecotourist visits relatively undisturbed areas in the spirit of appreciation, participation and sensitivity. The ecotourist practices a non-consumptive use of wildlife and natural resources and contributes to the visited area through labour or financial means aimed at directly benefiting the conservation of the site and the economic well-being of the residents. The visit should strengthen the ecotourist's appreciation to conservation issues in general, and to the specific needs of the locale. Ecotourism also implies a managed approach by the host country or region which commits itself to establishing and maintaining the sites with the participation of local residents, marketing them appropriately, enforcing regulations and using the proceeds of the enterprise to fund the area's land management as well as community development.

Ecotourists are said to be less demanding in terms of accommodation standards; they are more demanding in seeking information sources about their destination; and they
may act as "informal rangers" providing useful information to park managers (Boo, 1992).

NATURE TOURISM IN SRI LANKA

According to Wickramanayake (1992), ecotourism can contribute positively towards maintaining and managing Sri Lanka's system of protected areas and to the central economy. Developing protected areas and other natural habitats for high value low impact ecotourism to make them economically viable, will bring in valuable foreign exchange, help to develop the tourist industry, and provide jobs both locally and nationally. In addition to providing a method of economically exploiting the forests and protected areas compatible with conservation, such tourist traffic will also deter illegal logging and poaching and thus help police the forest and protected areas. A well designed system of trails will also define park boundaries and prevent encroachment. Again, local residents can find employment in helping to conserve Sri Lanka's wildlife.

Although ecotourism is a popular and increasingly attractive component of tourism in many countries (Costa Rica, Laos, Kenya etc.) Sri Lanka has yet to develop and promote this form of tourism. A primary advantage for Sri Lanka is that there is easy access to a number of different ecosystems within a short space of time. Sri Lanka is a small country but it has a diverse array of easily accessible ecosystems which are only two to four hours from each other by motor vehicle. Thus tourists can visit several different ecosystems and see more wildlife quickly and easily.

English is widely spoken and understood, which overcomes the language barrier prevalent in some other countries. The main problems are the lack of infrastructure and support services and a lack of on-site accommodation and interpretive services that would actively promote ecotourism. However, it is acknowledged that there is a great potential for ecotourism in Sri Lanka, which can be capitalized if the necessary services and infrastructure are made available.

The world heritage committee has included 6 of the Sri Lankan cultural sites in the World Heritage List under the protection of the world cultural and natural heritage (ICOMOS, 1993). They are, the sacred city of Anuradhapura, the ancient city of Polonnaruwa, the ancient city of Sigiriya, the sacred city of Kandy, the old town of Galle and its fortifications and the golden temple of Dambulla. These unique resources also offer a great potential when linked to ecotourism in Sri Lanka.

Sri Lanka's diverse ecosystems and biological and cultural richness have attracted the professional interests of numerous scientists, who have conducted field research in ecology, zoology, botany, sociology and anthropology over the past several decades. The long list of Sri Lanka's protected areas can play a major role in developing this sort of tourism - although most of them are currently in a state of deterioration.
A high area of protected lands (about 14%) indicates the nation's commitment to conservation (Wickramanayake, 1992). But most of these lands are not well managed due to financial and institutional constraints.

DATA COLLECTION

Both primary data and secondary data were used in this study. Primary data was collected between October 1994 and February 1995.

A questionnaire was designed and used for this purpose. There were four major sections. Section (A), containing 7 questions, was designed to give the socio-economic background of the visitor which could be used to identify places to advertise and promote this form of tourism. Section (B) had 12 questions on general information about the respondent's particular visit to Sri Lanka. Questions in section (C) were designed to obtain information on the visitor's attitude to the management of the natural resources of Sri Lanka. Four hypothetical situations were presented to obtain this information. Sections (B) and (C) were prepared in order to identify the type of tourist. Section (D), containing seven questions, was designed to obtain an evaluation of the visit to Sri Lanka.

A total of 200 questionnaires were used for the survey, 100 of these were produced in English and 50 in each of the other two languages (French and German). Since the questionnaire was a lengthy (detailed) one (30 questions on 5 pages), it was designed so that it could be taken to the visitor's place of stay and completed at leisure. A stamped and addressed envelope (to PGIA) with a covering letter was supplied.

STUDY AREA

Colombo, Hikkaduwa, Kandy and Polonnaruwa were selected to give the primary survey information. These places were selected to represent a cross section of the available amenities (urban, coastal, cultural & historic) of the country. Questionnaires were distributed to tourists in selected areas and the intention of the study was explained. About 50 questionnaires were left at hotels, restaurants and at the transit area of the Katunayake Airport in order to capture information from the visitors leaving the country.

REGRESSION ANALYSIS

Both parametric and non-parametric data were collected and multiple regression analysis and non-parametric data presentations have been employed.

A linear relationship between the nature tourism (composite score) and other independent variables was assumed and a Multiple Regression was employed to
estimate the relationship between these attributes and Nature Tourism (NT). The SAS statistical software package was used for this analysis.

The dependant variable has been constructed from a composite score. This was done in order to form a continuous dependant variable such that it could be used in the regression analysis. Five questions were used to form the composite score (dependant variable). They were weighted such that the highest weight was given to the most important questions in forming the composite score.

The marks for these 5 questions were added together to form the composite score for different individuals (the dependant variable, denoted by SCR [score]). The scores ranged from 9 to 27. The weighting procedure was used in such a way that the minimum SCR (9) will represent the "strongest" nature tourist and the maximum SCR (27) will represent the "weakest" nature tourist - or the traditional tourist.

RESULTS

Of the 200 questionnaires distributed, 20 were used for the pre-test, and only 81 of the questionnaires received were properly completed. Only these, therefore, were used for the analysis.

Classification and data presentation
Socio-economic information is presented in charts and tables using simple statistics
A. Average age of the visitor is 39 years. The youngest of the sample was 18 years and the oldest was 70 years old.
B. Average number of nights stayed by a visitor is 24. The shortest visit was 4 nights and the longest visit was 150 nights.
C. Average annual income of the visitors interviewed was US$ 33,000 (lowest, US$ 4,800; highest, US$ 75,000).
D. 55% of the respondents were men. The survey was conducted during the period October 1994 to February 1995.

Tourists from fourteen different nationalities were included in the sample.

About 40% of the tourists interviewed can be considered as "potential nature based tourists".

Information on the most important reasons given for selecting Sri Lanka as the destination are given in Table 1. The majority of visitors (45.7%) indicated sightseeing as the most important reason when selecting Sri Lanka as a travel destination.

Answers to questions on the level of importance of protected areas, cultural/native history, on the length of stay and on daily expenditure are summarized in Table 2. Here it can be seen that the nature oriented tourists spend more money in the country and they make shorter stays compared to others.
Table 1: Reasons for Selecting Sri Lanka as a Destination

<table>
<thead>
<tr>
<th>Reason</th>
<th>Number of Respondents</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Sightseeing</td>
<td>36</td>
<td>45.7</td>
</tr>
<tr>
<td>2. Sun &amp; Beach</td>
<td>12</td>
<td>15.2</td>
</tr>
<tr>
<td>3. Business/Convention</td>
<td>7</td>
<td>8.9</td>
</tr>
<tr>
<td>4. Cultural/ Native History</td>
<td>6</td>
<td>7.6</td>
</tr>
<tr>
<td>5. Archaeology</td>
<td>4</td>
<td>5.1</td>
</tr>
<tr>
<td>6. Natural History</td>
<td>3</td>
<td>3.7</td>
</tr>
<tr>
<td>7. Other</td>
<td>3</td>
<td>3.7</td>
</tr>
</tbody>
</table>

Almost half of the nature based tourists (NBT) indicated Kandy as the best city in Sri Lanka because of its cleanliness compared to other cities and its cultural heritage. The next cities were the ancient cities, like Polonnaruwa and Anuradhapura, preferred for their archaeological and historical importance.

Table 2: Comparison of average daily expenditure and length of stay by importance of Sri Lanka’s Protected area, Cultural/Native history in the selection of the country as a destination

<table>
<thead>
<tr>
<th></th>
<th>Main Reason</th>
<th>Important</th>
<th>Somewhat Important</th>
<th>Not Important</th>
</tr>
</thead>
<tbody>
<tr>
<td>Av. daily expenditure (Rs)</td>
<td>2096</td>
<td>1710</td>
<td>1273</td>
<td>1477</td>
</tr>
<tr>
<td>Av. Stay(nights)</td>
<td>19</td>
<td>21</td>
<td>26</td>
<td>27</td>
</tr>
<tr>
<td>No. Respondents</td>
<td>7</td>
<td>26</td>
<td>24</td>
<td>16</td>
</tr>
</tbody>
</table>

Questions were asked to get information on whether respondents would recommend Sri Lanka to their friends and relatives and whether they themselves would return to Sri Lanka for another vacation. These responses were presented with the selection of the country as a destination in terms of the importance of the protected areas. Many nature based tourists (52%) are not willing to come back to Sri Lanka but they are willing to recommend Sri Lanka as a destination to their friends and relatives. This may be due to the fact that nature based tourists prefer the excitement of visiting new places rather returning to known places.

In contrast, traditional tourists are more likely to return to Sri Lanka. They too would highly recommend Sri Lanka as a travel destination to their friends and relatives. Altogether 17 to 20% of the respondents had not decided whether to come back or not, and whether to recommend or not. This is because some of the visitors interviewed were in the very early days of their visit so they did not have enough experience in the country to make such a decision.

Among the various suggestions made for the improvements to upgrade the quality of a visit to Sri Lanka, the following were the most commonly mentioned.

1. Improvement in the road quality (12%).
Annual Forestry Symposium, 1995

2. It is necessary to take steps to reduce inconvenience caused by touts (26%).
3. Large scale tourism should not be encouraged (10%).
4. Information on sites are not adequate. Some published material has not been updated for decades. Interpretation has to be developed (6%).
5. Increase observation facilities on trains. Special train services to the up country should include more 2nd class compartments. Some tourists mentioned that sometimes they could not find a seat in a train which minimizes the sight seeing value of the journey (2%).
6. Cleaner environment (12%).
7. Better guidance (30%).
8. Less crowded buses and trains (2%).

This shows that visitors place a higher priority on better guidance and information (altogether 36%). Also, they are irritated by touts (26%).

Regression results

Estimation model is:

\[ \text{SCR} = 11.307 + 0.01 \text{WTP}^* - 0.12 \text{AGE} + 1.48 \text{EDU}^* - 0.006 \text{ANU} - 1.75 \text{VIS}^* - 0.03 \]

\[ (0.256) \quad (0.0004) \quad (0.097) \quad (0.653) \quad (0.069) \quad (0.696) \quad (0.02) \]

with \( R^2 = 0.6345 \) at the 0.05 alpha level

Where,

SCR is the dependant variable. This continuous variable was prepared by weighing selected responses of visitor. The weighing is done in such a way that the lowest score (SCR) represents the highest degree of NBT and highest SCR represents the least degree of NBT. Thus, the SCR is inversely related to the NBT.

WTP Visitors willingness to pay for non-consumptive use of wildlife in Sri Lanka

AGE Age of the visitor

EDU Education level of the visitor

ANU Average annual income of the visitor in Rs

VIS Total number of visits made by the visitor to Sri Lanka, including this visit

* indicates the variables significant at 5% level

() figures in parenthesis show the standard deviations of the estimates.

CONCLUSIONS AND RECOMMENDATIONS

This study shows that there is a substantial demand for nature tourism in Sri Lanka. Such tourism involves visiting relatively undeveloped areas, non-consumptive use of wildlife and natural resources, and contributes to natural resources and community development (Wickramanayake, 1992). This form of tourism is more beneficial to
the local people and the natural resources base of the country can be used as a capital good in this industry. Conflicts can be avoided when local people play an integral role in selecting and managing protected areas. Also, nature tourists may act as "informal rangers" providing useful information to park management. If properly introduced and implemented, nature tourism will help to improve management and conservation of our natural resources while earning foreign exchange at the same time. Thus, promotion of nature tourism in Sri Lanka, with proper planning and monitoring, can be recommended.

This study identified that the interpretation and infrastructure facilities at potential nature tourism areas are minimal. It is proposed that nature tourism should be started with pilot projects which provide better interpretative services and visitor centres within or closer to such potential nature tourism areas. Before promoting this type of tourism on a large scale, experience from such pilot projects and from carrying capacity studies for specific locations have to be carried out.

Development of nature tourism has not been addressed in the Ceylon Tourist Board (CTB) updated Master Plan for the tourism sector. The role of ecotourism in terms of sustainable tourism development should be studied and included in the planning and development of tourism. The CTB should get technical assistance in developing such plans from agencies like the Central Environmental Authority, the Forest Department, the Department of Wildlife Conservation, Universities and any other relevant source.

In conclusion, most of the visitors mentioned bad experiences that they had faced in Sri Lanka due to the activities of touts. As remedial measures, more inquiry centres for tourists who want to walk on their own, fixed prices in tourist shops, comprehensive maps and folders on specific localities and up to date and comprehensive lodging services should be provided by the CTB.

REFERENCES

Balasuriya, O.M.T. (Ed.) (1993). *Tourism Boom or Doom?*, Colombo: Centre for Society and Religion


